



# Disaster and Mental Health

# Disaster Characteristics and Reactions



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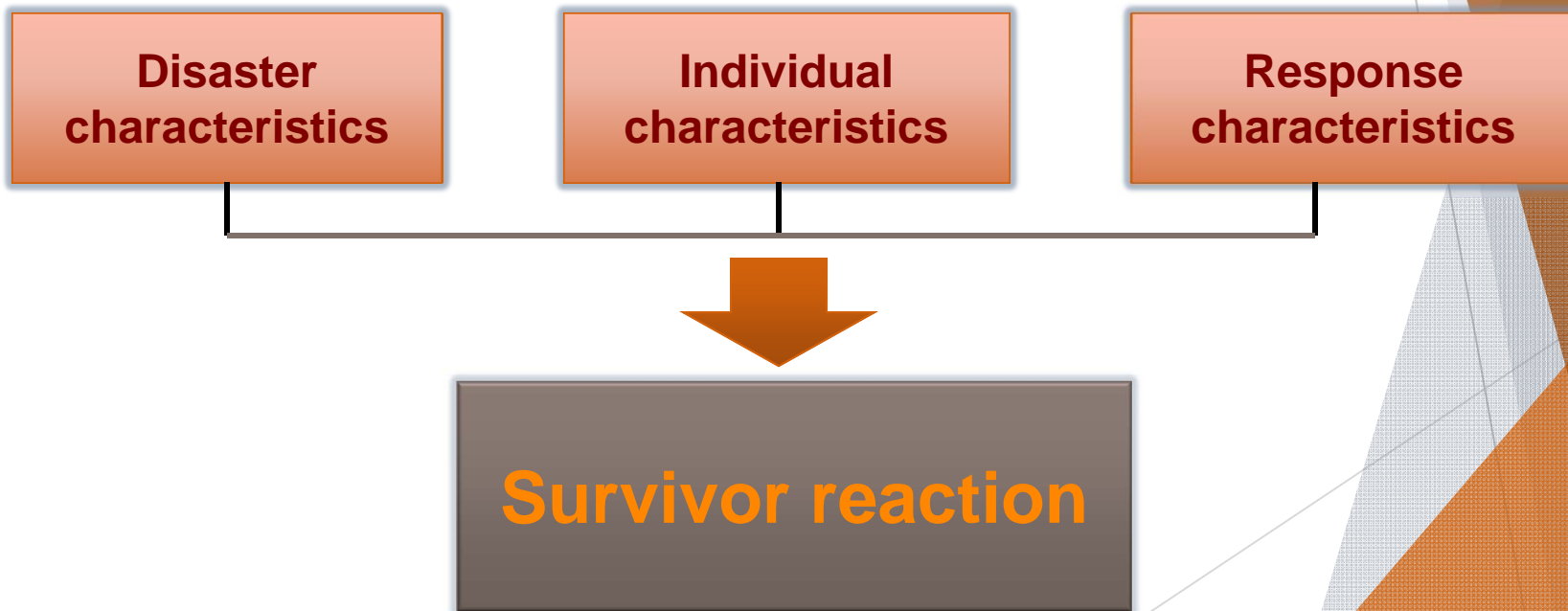
# Disaster Characteristics and their Mental Health Impact

- ▶ Disasters are not uncommon events
- ▶ No two disasters are exactly alike, but certain characteristics tend to be associated with specific reactions among survivors
- ▶ However...
  - ❖ No two survivors are the same
  - ❖ No two disaster experiences are the same
  - ❖ No two response and recovery experiences are the same

***Therefore, individuals' perceptions of and responses to a shared event will differ***

# Predictors of Survivor Reactions

Any one survivor's reaction will result from an interaction between the characteristics of the disaster, the individual, and the response.



# Characteristics of Disasters

- ▶ **Size** (scope, intensity, and duration)
- ▶ **Cause** (natural vs. human)
- ▶ **Expected or unexpected**
- ▶ **Timing** (time of day, day of week, season)

# Characteristics of Disasters: Size

***“Dose-response relationship”***

**Greater scope, intensity, and/or  
duration**



**Typically more traumatic impact on  
survivors**

# Characteristics of Disasters: Cause

- ▶ **Natural**

- ▶ **Human-caused**

- ▶ **Na-tech**

- (natural event leading to technical failure)

- ▶ **Public health emergencies**

# Disaster's Impact: A Range of Reactions

- ▶ **Common vs. Extreme**
- ▶ **Recovery as the expectable outcome**

***Post-disaster traumatic stress does not equal  
posttraumatic stress disorder***



# Disaster's Impact: Risk factors

**Vulnerable populations** - groups that may have more intense needs before, during, and after disaster, include:

- ▶ Children
  - ▶ The elderly (particularly the frail elderly)
  - ▶ People with serious mental illness
    - ▶ People with physical disabilities
    - ▶ People with substance dependency
    - ▶ People living in poverty

# Common Reactions

- ▶ **Physical**
  - ▶ **Emotional**
    - ▶ **Cognitive**
      - ▶ **Behavioral**
        - ▶ **Spiritual**

# Common Reactions

- ▶ Expectable reactions based on exposure to extreme stress
- ▶ Range of possible reactions makes early assessment challenging and underscores importance of establishing a positive and supportive recovery environment
- ▶ Dynamic, not static - reactions evolve over time and are influenced by the disaster life cycle

# Proximity and the Dose-Response Relationship

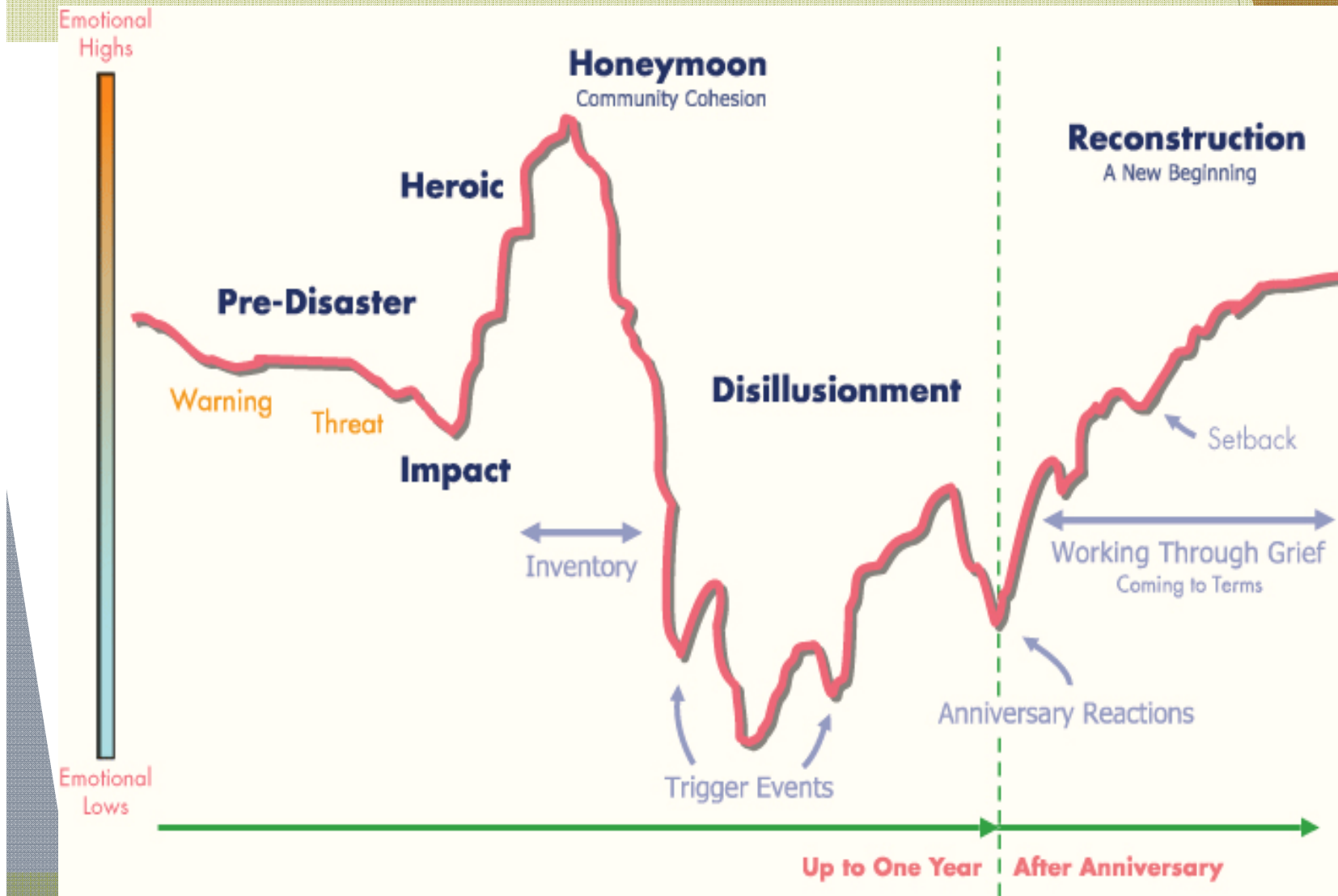
- ▶ Those most exposed to a disaster typically will have the most immediate needs and perhaps more serious psychological consequences
- ▶ Main convergence of aid and supportive services is at the epicenter of a disaster
- ▶ *However:* Intense reactions are not predicted by this alone and even those who do not have direct exposure may have strong reactions

# Life Cycle of Disaster Reactions

Reactions occur in stages/phases:

- ▶ **Pre-impact:** Disasters with warnings allow people to prepare and initiate coping mechanisms
- ▶ **Impact:** Magnified arousal levels (fight, flight, or freeze); usually little panic; behavior in this phase is related to later recovery
- ▶ **Post-impact:** Reactions unfold over the heroic, honeymoon, disillusionment, and reconstruction phases

# Phases of Emotional Response



# Disaster Loss and Grief

- ▶ Disasters bring tangible/physical losses as well as symbolic or more abstract ones
- ▶ Tangible losses include loved ones and pets, property, job, mementoes
- ▶ Less obvious, but no less real, losses include a way of life, a sense of personal invulnerability, self-esteem or identity, and trust in God or protective powers
- ▶ Disaster mental health workers' awareness of the types of losses:
  - ❖ enables validation of the experience of disaster victims who may be unable to understand or legitimize their sadness or grief
  - ❖ supports the natural grief and recovery process

# Survivor Guilt

- ▶ Subtle secondary emotion which may occur in
  - ❖ those who survive a disaster where others have not
  - ❖ those who identify with victims
- ▶ May interfere with recovery
- ▶ Characterized by cognitive misappraisals or illogical conclusions
- ▶ Disaster mental health workers can listen for such indicators and gently challenge them



# Extreme Reactions: PTSD

- ▶ Most common extreme reaction is posttraumatic stress disorder (PTSD)
- ▶ Not a “typical” response to stress:
  - ❖ Estimated rate post-disaster is approximately 20%
  - ❖ Rate varies widely by event type, from 4-5% after natural disasters to 34% after a bombing
- ▶ Considered a treatable disorder which currently has several evidence-based therapies to promote recovery

# Extreme Reactions: Complicated Grief

- ▶ Grief is not a mental disorder, but an expected process in response to the death of a loved one that is followed by a gradual return of the capacity for reinvestment in new interests, activities, and relationships
- ▶ Complicated grief not yet a DSM diagnosis
- ▶ Alludes to an unremitting grief response that can interfere with a return to a full life
- ▶ May be confused with PTSD

# Extreme Reactions: Co-Morbid Disorders

- ▶ Often, more than one disorder is present post-disaster
- ▶ 80% of those diagnosed with PTSD will also have another diagnosable condition, most commonly:
  - ❖ Depression
  - ❖ Generalized anxiety disorder
- ▶ Using alcohol as a way to cope with disaster stress may be common but is not typically problematic:
  - ❖ New presentations of alcohol or substance disorder post-disaster are infrequent
  - ❖ However, in those with pre-existing substance use disorders, disaster stress can exacerbate it

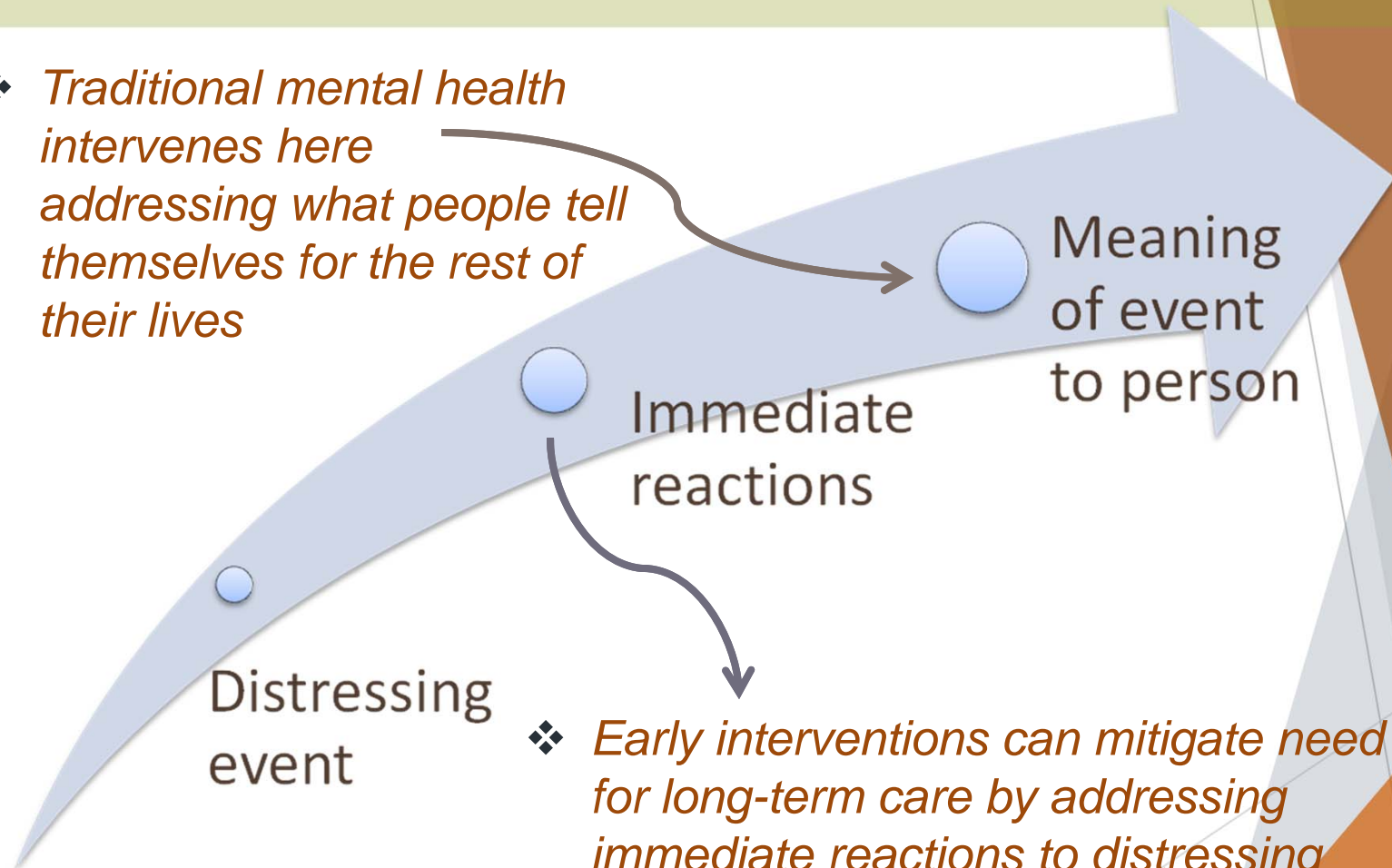
# DMH Interventions: Current Best Practices



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# The Importance of Early Intervention

❖ *Traditional mental health intervenes here addressing what people tell themselves for the rest of their lives*



❖ *Early interventions can mitigate need for long-term care by addressing immediate reactions to distressing event*

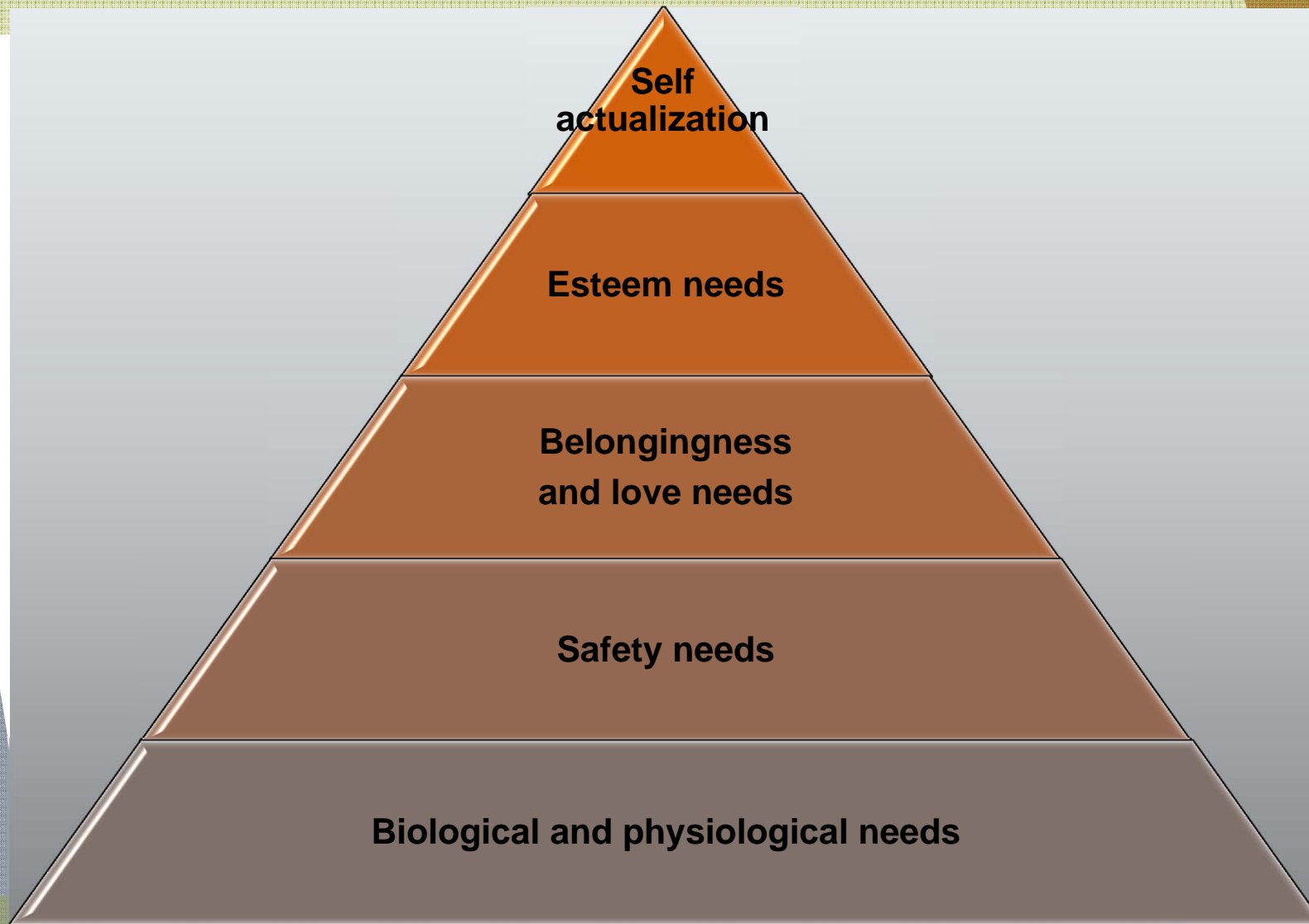
# Evidence-Based Principles of Early Intervention

**Intervention and prevention efforts should include:**

- ▶ Promoting sense of safety
  - ▶ Promoting calm
  - ▶ Promoting sense of efficacy in self and community
  - ▶ Promoting connectedness
  - ▶ Instilling hope

(Hobfoll et al., 2007)

# Maslow's Hierarchy of Needs



# Defining Psychological First Aid

- ▶ Evidence-informed and pragmatically oriented early interventions that address acute stress reactions and immediate needs for survivors and emergency responders in the period immediately following a disaster
- ▶ The goals of Psychological First Aid include the establishment of *safety* (objective and subjective), *stress-related symptom reduction*, *restoration of rest and sleep*, *linkage to critical resources* and *connection to social support*

(NIMH, 2002)



# How is PFA Distinct from Therapy or Counseling?

- ▶ Short-term
  - ▶ Symptom reduction, not treatment
    - ▶ Promotion of healing, not opening up past wounds for examination
      - ▶ Focus on interrelated practical, physical and emotional needs
        - ▶ Here and now

# Theoretical Roots of PFA

- ▶ The core attitudes and actions of effective PFA can be traced to the work of two eminent humanistic psychologists:
  - ❖ Carl Rogers emphasizes unconditional positive regard, empathy, and genuineness
  - ❖ Abraham Maslow's hierarchy of needs emphasizes the importance of attending to survivors' physical and safety issues first
- ▶ DMH counseling involves “working the Maslow hierarchy” from the bottom up
- ▶ Flexibility, flexibility, flexibility

# Settings for DMH Work

- ❖ At the site of a disaster/traumatic event
  - ❖ Disaster Recovery or Assistance Centers
    - ❖ Headquarters or Command Centers
    - ❖ Shelters
      - ❖ Schools and hospitals
      - ❖ Memorials
      - ❖ On the phone
      - ❖ Just about anywhere

# Challenges in DMH

## **The practice of DMH is unpredictable:**

- ▶ DMH response varies widely from one event to the next
- ▶ Counseling can last for a few minutes or a few hours

## **DMH lacks standardization:**

- ▶ Who provides DMH, under what circumstances, and with what training and background varies widely

## **DMH response is not always well defined in local CEMP:**

- ▶ To be effective DMH needs to be a well-defined and exercised part of emergency management planning and preparedness

# Thank-you...

Material for this presentation is drawn from DMH training curriculums developed for NYS OMH and DOH by the University of Rochester and the Institute for Disaster Mental Health at SUNY New Paltz.

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